Go To Table Of Contents

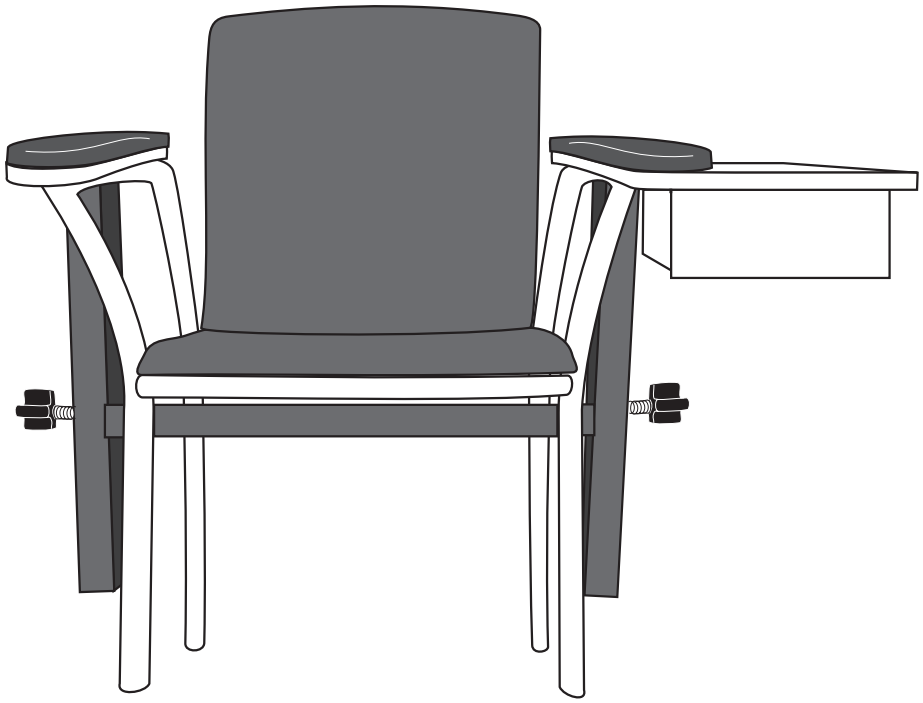
165 -001 thru -006

Ritter® by MIDMARK

Blood Drawing Chair

Serial Number Prefix:
BC, HT & NS

Service and Parts Manual



FOR USE BY MIDMARK TRAINED TECHNICIANS ONLY

SF-1517

Part No. 004-0031-00 Rev. K (1/01/04)

Go To Table Of Contents

TABLE OF CONTENTS

Section/Paragraph	Page
IMPORTANT INSTRUCTIONS	
General Safety Instructions	ii
Safety Alert Symbols	ii
Warranty Instructions	ii
SECTION I GENERAL INFORMATION	
Not Available	
SECTION II TESTING AND TROUBLESHOOTING	
Not Available	
SECTION III SCHEDULED MAINTENANCE	
Not Available	
SECTION IV MAINTENANCE/SERVICE INSTRUCTIONS	
Not Available	
SECTION V SCHEMATICS AND DIAGRAMS	
Not Available	

Section/Paragraph	Page
SECTION VI PARTS LIST	
6.1 Introduction	6-1
6.2 Description Of Columns	6-1
6.3 Torque Specifications And Important Assembly Notes	6-1
Blood Drawing Chair (165-001/002)	6-2(*)
Chair Arm with Drawer	6-3(*)
Fixed Chair Arm	6-4
Rotating Chair Arm	6-5
Blood Drawing Chair (165-003/004)	6-6
Blood Drawing Chair (165-005/006)	6-7
R. H. Drawer Assembly	6-8
Rotating Arm Assembly	6-9
COMMENTS	7-1
FAX ORDERING FORM	7-2

(*) Indicates that there has been a serial number break for the illustration and that there are additional point page(s) following the original page.

© Midmark 1996 SF-1517 Rev. 7/00

Printed in U.S.A.

IMPORTANT INSTRUCTIONS

General Safety Instructions

Safety First: The primary concern of Midmark Corporation is that this table is maintained with the safety of the patient and staff in mind. To assure that services and repairs are completed safely and correctly, proceed as follows:

(1) Read this entire manual before performing any services or repairs on this table.

(2) Be sure you understand the instructions contained in this manual before attempting to service or repair this table.

Safety Alert Symbols

Throughout this manual are safety alert symbols that call attention to particular procedures. These items are used as follows:

DANGER

A DANGER is used for an imminently hazardous operating procedure, practice, or condition which, if not correctly followed, will result in loss of life or serious personal injury.

WARNING

A WARNING is used for a potentially hazardous operating procedure, practice, or condition which, if not correctly followed, could result in loss of life or serious personal injury.

CAUTION

A CAUTION is used for a potentially hazardous operating procedure, practice, or condition which, if not correctly followed, could result in minor or moderate injury. It may also be used to alert against unsafe practices.

EQUIPMENT ALERT

An EQUIPMENT ALERT is used for an imminently or potentially hazardous operating procedure, practice, or condition which, if not correctly followed, will or could result in serious, moderate, or minor damage to unit.

NOTE

A NOTE is used to amplify an operating procedure, practice or condition.

Warranty Instructions

Refer to the Midmark "Limited Warranty" printed in the Installation and Operation Manual for warranty information. Failure to follow the guidelines listed below will void the warranty and/or render the 165 Blood Drawing Chair unsafe for operation.

- In the event of a malfunction, do not attempt to operate the table until necessary repairs have been made.
- Do not attempt to disassemble table, replace malfunctioning or damaged components, or perform adjustments unless you are one of Midmark's authorized service technicians.
- Do not substitute parts of another manufacturer when replacing inoperative or damaged components. Use only Midmark replacement parts.

© Midmark 1996 SF-1517 Rev. 2/00

Printed in U.S.A.

SECTION VI
PARTS LIST

6.1 Introduction

The illustrated parts list provides information for identifying and ordering the parts necessary to maintain the unit in peak operating condition. Refer to paragraph 1.5 for parts ordering information.

The parts list also illustrates disassembly and assembly relationships of parts.

6.2 Description of Columns

The *Item* column of the parts list gives a component its own unique number. The same number is given to the component in the parts illustration. This allows a part number of a component to be found if the technician can visually spot the part on the illustration. The technician simply finds the component in question on the illustration and notes the item number of that component. Then, he finds that item number in the parts list. The row corresponding to the item number gives the technician the part number, a description of the component, and quantity of parts per subassembly. Also, if a part number is known, the location of that component can be determined by looking for the item number of the component on the illustration.

The *Part No.* column lists the MIDMARK part number for that component.

The *Description* column provides a physical description of the component.

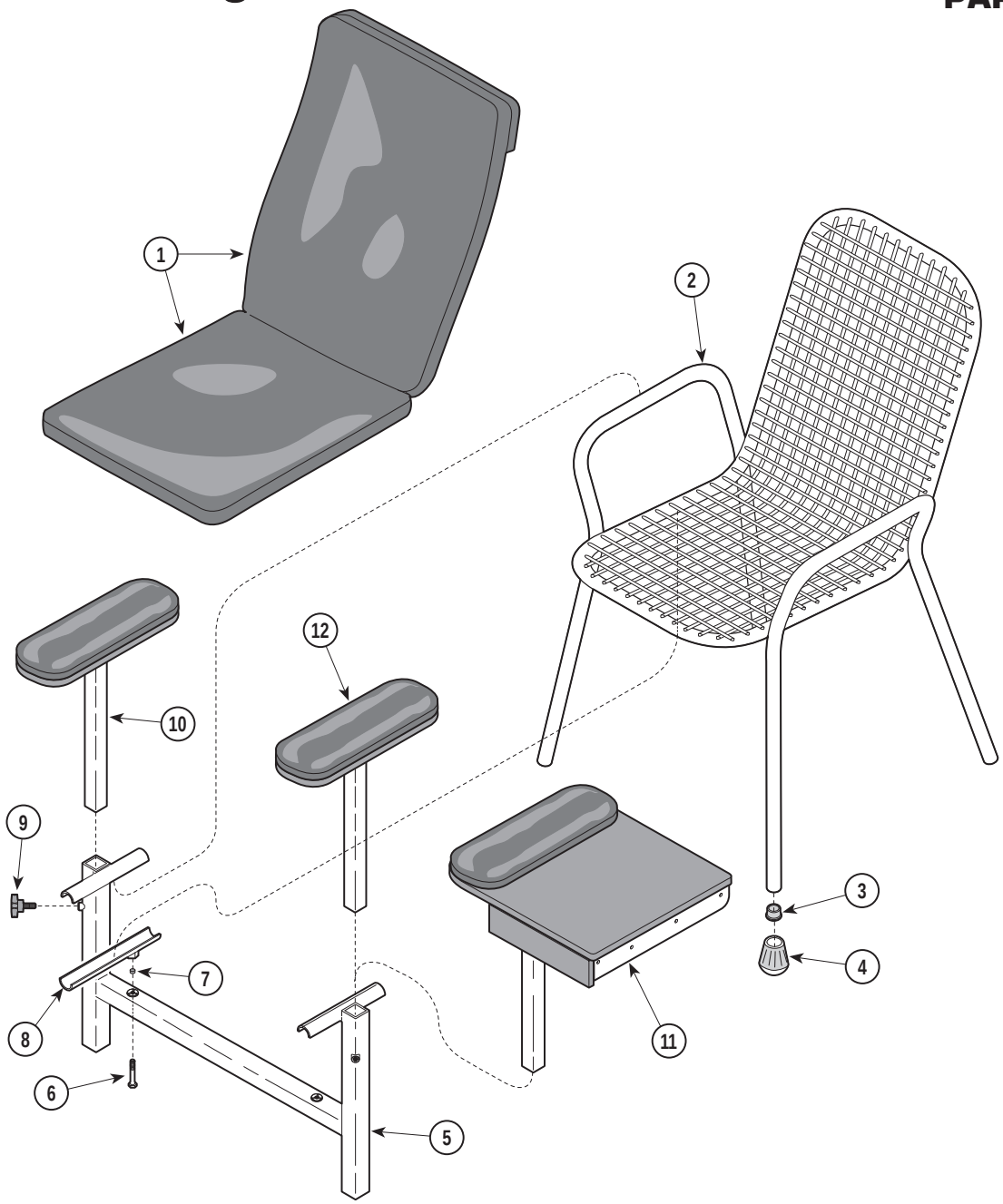
The *Qty.* column lists the number of units of a particular component that is required for the subassembly. The letters “AR” denote “as required” when quantities of a particular component cannot be determined, such as: adhesive.

Bullets { • } in the *Part No.* column and the *Description* column show the indenture level of a component. If a component does not have a bullet, it is a main component of that illustration. If a component has a bullet, it is a subcomponent of the next component listed higher in the parts list than itself that does not have a bullet. Likewise, if a component has two bullets, it is a subcomponent of the next component listed higher in the parts list than itself that has only one bullet.

© Midmark Corporation 1996 SF-1517

Printed in U.S.A.

Blood Drawing Chair



MA332400

Used On Units With Serial Number BC1000 thru BC7189

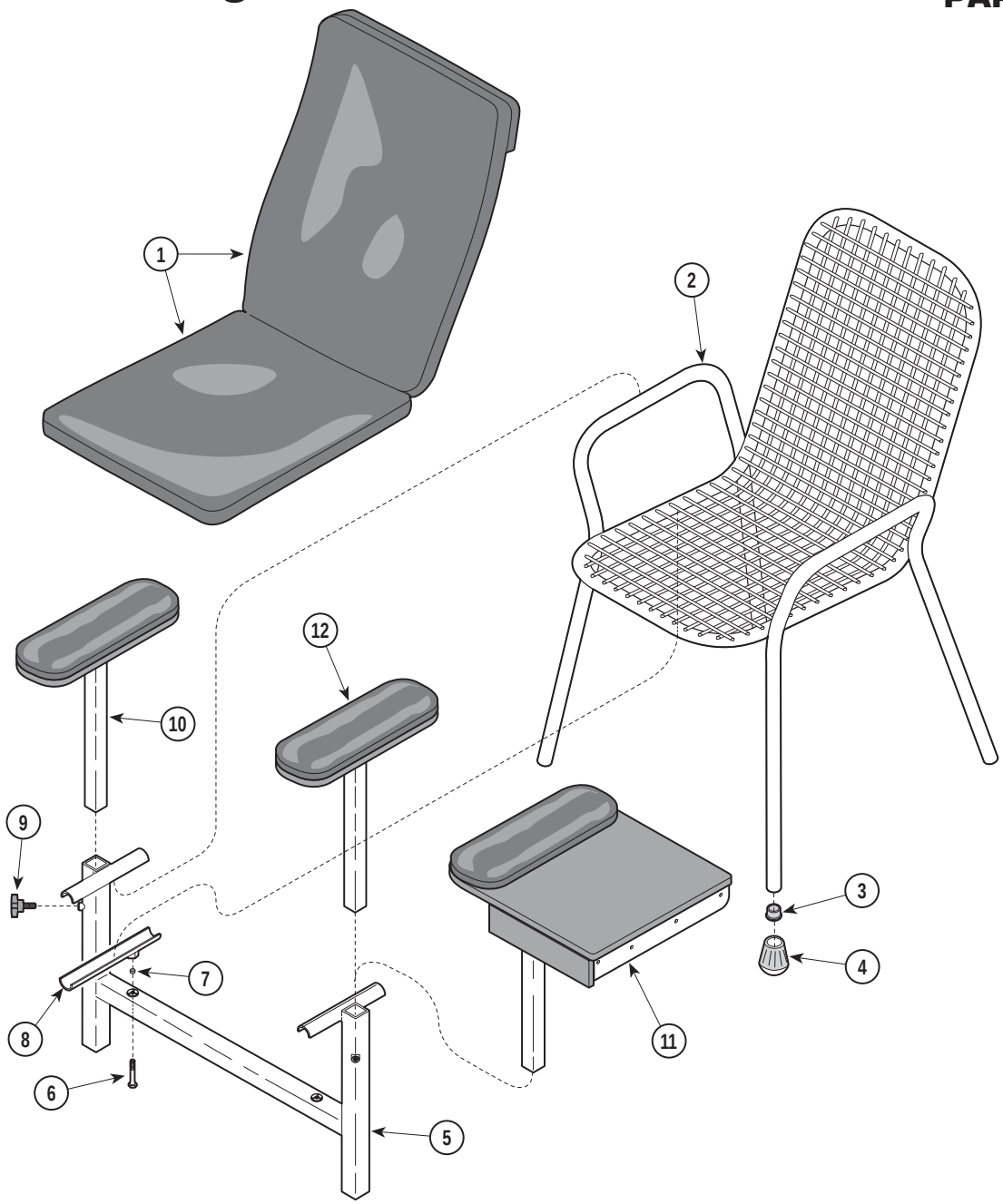
Item	Part No.	Description	Qty.
	165-001	Blood Drawing Chair w/ Drawer (Includes Items 1 thru 11)	1
	165-002	Blood Drawing Chair w/ Fixed Arm (Includes Items 1 thru 10 and 12)	1
1	• 028-0167-00	• Upholstered Cushion Set (Specify Color)	1
2	• 030-0301-00	• Chair (Ice White[No Longer Available])	1
3	• 553-0093-02	• Tubing Insert	4
4	• 053-0373-00	• Chair Foot Tip	4
5	• 030-0448-00	• H Frame Weldment	1
6	• 040-0312-19	• Screw	2
7	• 053-0249-00	• Delrin Plug	2
8	• 030-0450-00	• Chair Clamp Weldment	2
9	• 016-0304-00	• Clamping Knob	2
10	•	• Rotating Chair Arm (Refer to "Rotating Chair Arm" Elsewhere)	Ref
11	•	• Drawer Chair Arm (Refer to "Chair Arm w/ Drawer" Elsewhere)	Ref
12	•	• Fixed Chair Arm (Refer to "Fixed Chair Arm" Elsewhere)	Ref

Always Specify Model & Serial Number

© Midmark Corporation 1996 SF-1517 Rev. 7/97

Printed in U.S.A.

Blood Drawing Chair



MA332400

Used On Units With Serial Number BC7190 thru BC12120

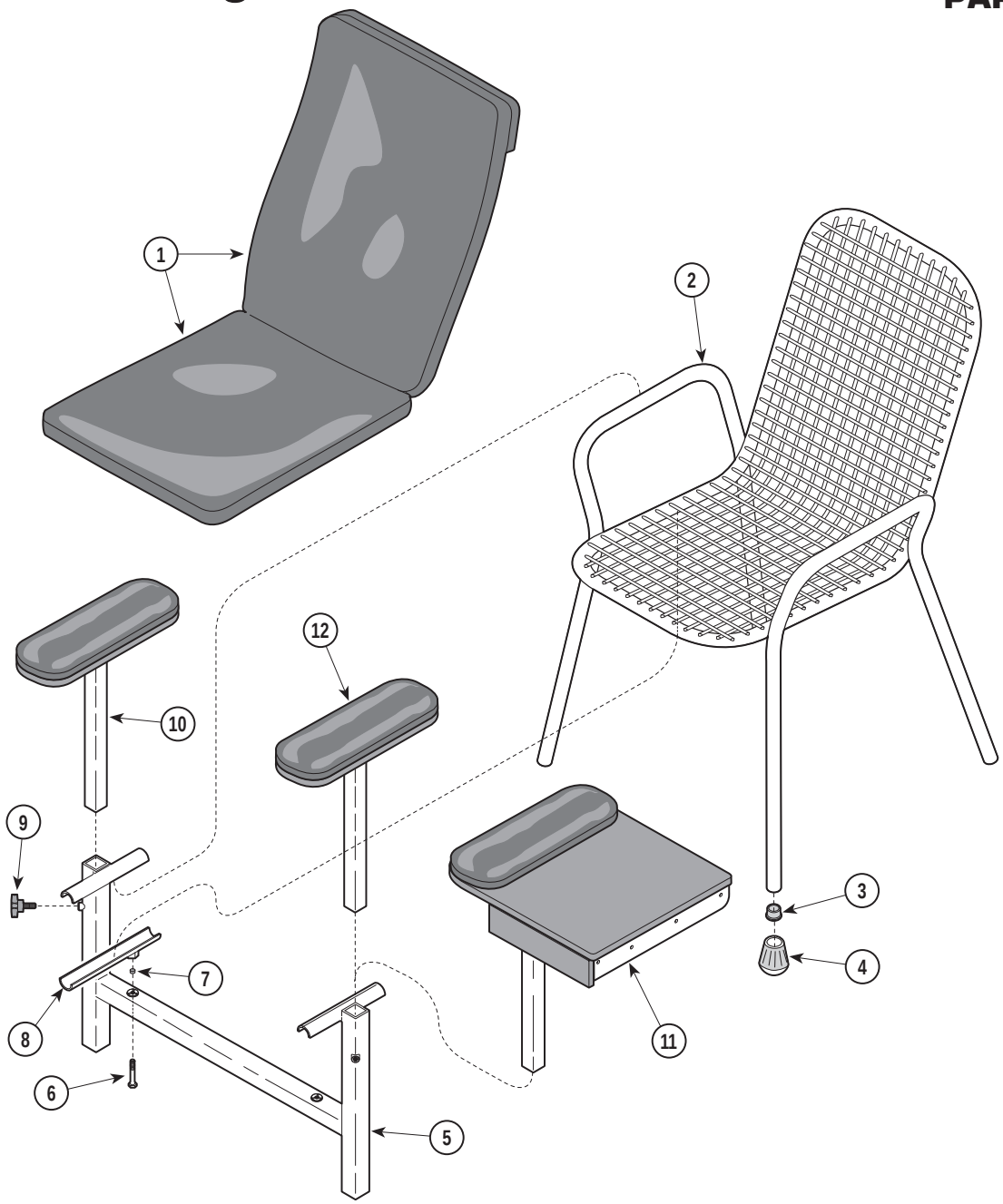
Item	Part No.	Description	Qty.
	165-001	Blood Drawing Chair w/ Drawer (Includes Items 1 thru 11)	1
	165-002	Blood Drawing Chair w/ Fixed Arm (Includes Items 1 thru 10 and 12)	1
1	• 028-0167-00	• Upholstered Cushion Set (Specify Color)	1
2	• 030-0301-00	• Chair (Ice White[No Longer Available])	1
3	• 553-0093-02	• Tubing Insert	4
4	• 053-0373-00	• Chair Foot Tip	4
5	• 030-0448-01	• H Frame Weldment	1
6	• 040-0312-19	• Screw	2
7	• 053-0249-00	• Delrin Plug	2
8	• 030-0450-01	• Chair Clamp Weldment	2
9	• 016-0304-00	• Clamping Knob	2
10	•	• Rotating Chair Arm (Refer to "Rotating Chair Arm" Elsewhere)	Ref
11	•	• Drawer Chair Arm (Refer to "Chair Arm w/ Drawer" Elsewhere)	Ref
12	•	• Fixed Chair Arm (Refer to "Fixed Chair Arm" Elsewhere)	Ref

Always Specify Model & Serial Number

© Midmark Corporation 1996 SF-1517 Rev. 7/97

Printed in U.S.A.

Blood Drawing Chair



MA332400

Used On Units With Serial Number BC12121 thru Present

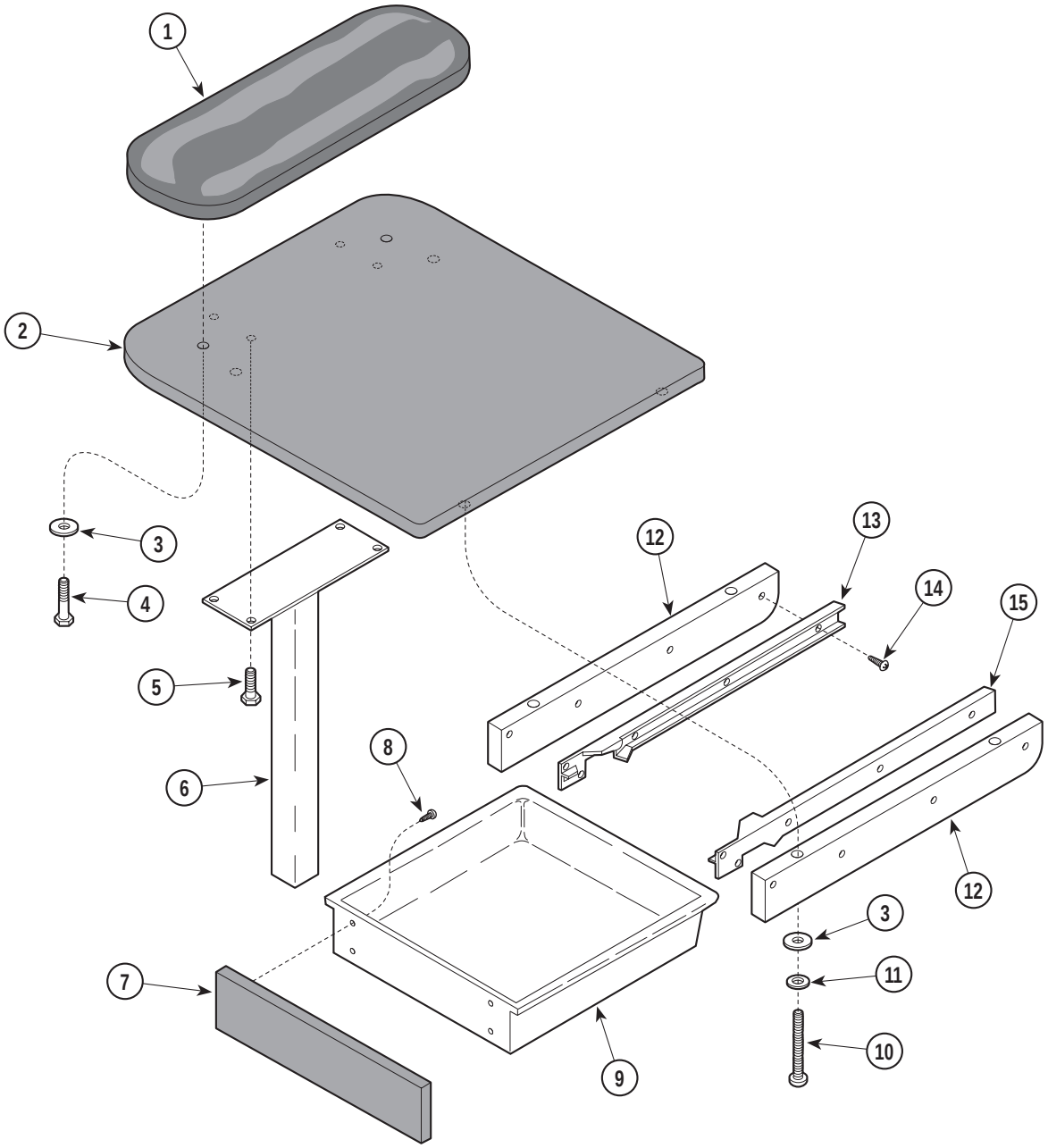
Item	Part No.	Description	Qty.
	165-001	Blood Drawing Chair w/ Drawer (Includes Items 1 thru 11)	1
	165-002	Blood Drawing Chair w/ Fixed Arm (Includes Items 1 thru 10 and 12)	1
1	• 028-0447-00	• Upholstered Cushion Set (Specify Color)	1
2	• 030-0821-10	• Chair (Pearl Grey)	1
3	• 553-0093-02	• Tubing Insert	4
4	• 053-0373-00	• Chair Foot Tip	4
5	• 030-0448-01	• H Frame Weldment	1
6	• 040-0312-19	• Screw	2
7	• 053-0249-00	• Delrin Plug	2
8	• 030-0450-01	• Chair Clamp Weldment	2
9	• 016-0304-00	• Clamping Knob	2
10	•	• Rotating Chair Arm (Refer to "Rotating Chair Arm" Elsewhere)	Ref
11	•	• Drawer Chair Arm (Refer to "Chair Arm w/ Drawer" Elsewhere)	Ref
12	•	• Fixed Chair Arm (Refer to "Fixed Chair Arm" Elsewhere)	Ref

Always Specify Model & Serial Number

© Midmark Corporation 1996 SF-1517 Rev. 7/97

Printed in U.S.A.

Chair Arm with Drawer



MA332900

Used On Units With Serial Number BC1000 thru BC7298

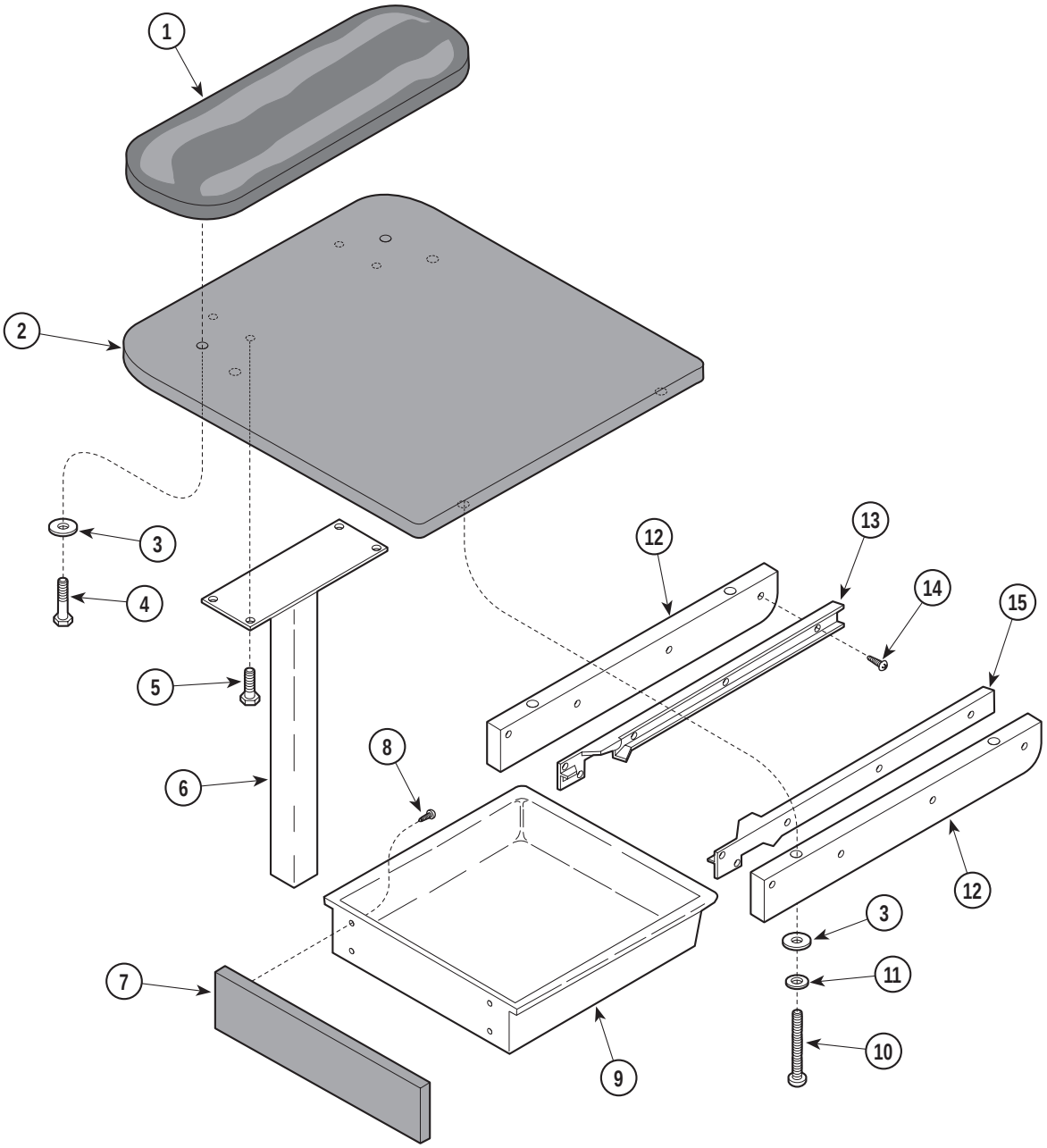
Item	Part No.	Description	Qty.
	029-0604-00	Chair Arm w/ Drawer - Ice White (Includes Items 1 thru 15)	1
	029-0604-01	Chair Arm w/ Drawer - Pearl Grey (Includes Items 1 thru 15)	1
1	• 028-0165-XX	• Upholstered Chair Arm(Specify Color)	1
2	• 029-0603-00	• Chair Arm Board (Ice White)	1
	• 029-0603-01	• Chair Arm Board (Pearl Grey)	1
3	• 045-0001-02	• Washer	6
4	• 040-0250-38	• Screw	2
5	• 040-0250-89	• Screw	4
6	• 030-0449-00	• Inner Telescope Weldment	1
7	• 055-7213-00	• Drawer Front (Ice White)	1
	• 055-7213-01	• Drawer Front (Pearl Grey)	1
8	• 040-0006-00	• Screw	4
9	• 053-0055-00	• Drawer	1
10	• 040-0250-55	• Screw	4
11	• 045-0001-23	• Lockwasher	4
12	• 055-7201-00	• Drawer Slide Mount	2
13	• 053-0006-00	• L.H. Drawer Runner (Apply Petroleum Jelly #064-0001-00)	1
14	• 040-0006-39	• Screw	8
15	• 053-0005-00	• R.H. Drawer Runner (Apply Petroleum Jelly #064-0001-00)	1

Always Specify Model & Serial Number

© Midmark Corporation 1996 SF-1517 Rev. 2/98

Printed in U.S.A.

Chair Arm with Drawer



MA332900

Used On Units With Serial Number BC7299 thru Present

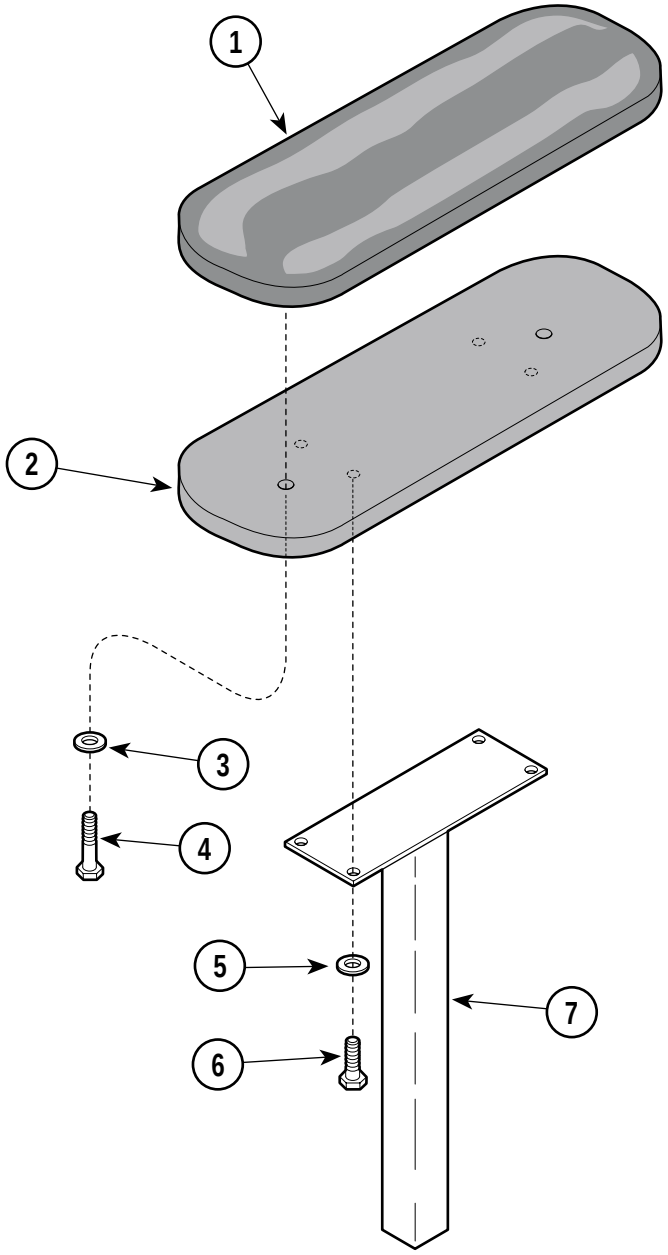
Item	Part No.	Description	Qty.
	029-0604-00	Chair Arm w/ Drawer - Ice White (Includes Items 1 thru 15)	1
	029-0604-01	Chair Arm w/ Drawer - Pearl Grey (Includes Items 1 thru 15)	1
1	• 028-0165-XX	• Upholstered Chair Arm(Specify Color)	1
2	• 029-0603-00	• Chair Arm Board (Ice White)	1
	• 029-0603-01	• Chair Arm Board (Pearl Grey)	1
3	• 045-0001-02	• Washer	6
4	• 040-0250-38	• Screw	2
5	• 040-0250-89	• Screw	4
6	• 030-0449-00	• Inner Telescope Weldment	1
7	• 055-7213-00	• Drawer Front (Ice White)	1
	• 055-7213-01	• Drawer Front (Pearl Grey)	1
8	• 040-0006-00	• Screw	4
9	• 053-0055-03	• Drawer	1
10	• 040-0250-55	• Screw	4
11	• 045-0001-23	• Lockwasher	4
12	• 055-7201-00	• Drawer Slide Mount	2
13	• 053-0006-06	• L.H. Drawer Runner (Apply Petroleum Jelly #064-0001-00)	1
14	• 040-0006-39	• Screw	8
15	• 053-0005-05	• R.H. Drawer Runner (Apply Petroleum Jelly #064-0001-00)	1

Always Specify Model & Serial Number

© Midmark Corporation 1996 SF-1517 Rev. 2/98

Printed in U.S.A.

Fixed Chair Arm



MA333000

Used On Units With Serial Number BC1000 thru Present

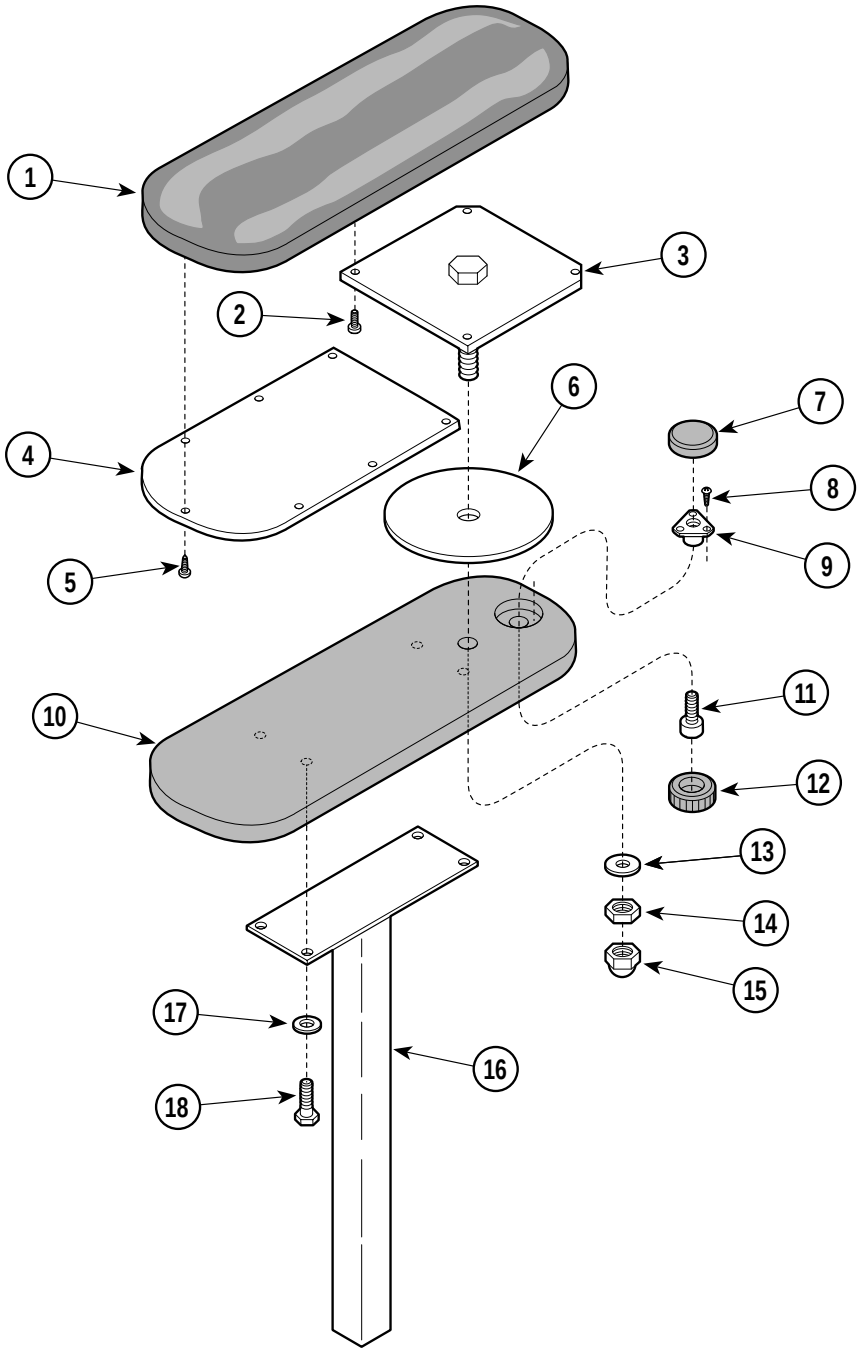
Item	Part No.	Description	Qty.
	029-0599-00	Fixed Chair Arm - Ice White (Includes Items 1 thru 7)	1
	029-0599-01	Fixed Chair Arm - Pearl Grey (Includes Items 1 thru 7)	1
1	• 028-0165-XX	• Upholstered Chair Arm (Specify Color)	1
2	• 029-0598-00	• Chair Arm Board (Ice White)	1
	• 029-0598-01	• Chair Arm Board (Pearl Grey)	1
3	• 045-0001-02	• Washer	2
4	• 040-0250-38	• Screw	2
5	• 045-0001-23	• Lockwasher	4
6	• 040-0250-36	• Screw	4
7	• 030-0449-00	• Inner Telescope Weldment	1

Always Specify Model & Serial Number

© Midmark Corporation 1996 SF-1517

Printed in U.S.A.

Rotating Chair Arm



MA333100

Used On Units With Serial Number BC1000 thru Present

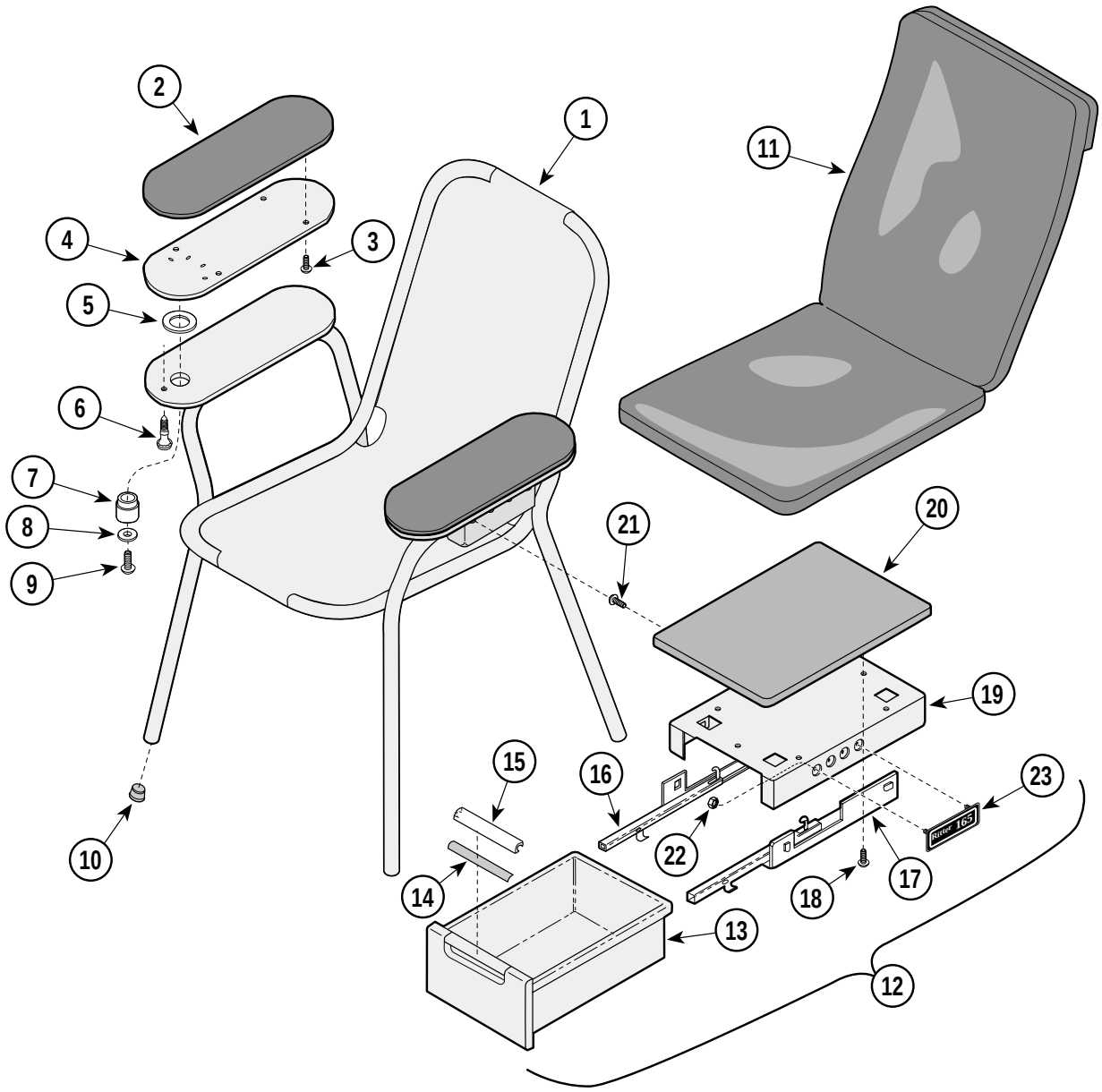
Item	Part No.	Description	Qty.
	029-0602-00	Rotating Chair Arm - Ice White (Includes Items 1 thru 18)	1
	029-0602-01	Rotating Chair Arm - Pearl Grey (Includes Items 1 thru 18)	1
1	• 028-0166-XX	• Upholstered Chair Arm (Specify Color)	1
2	• 040-0006-38	• Screw	4
3	• 030-0444-00	• Clamp Plate Weldment	1
4	• 053-0261-00	• Scuff Plate	1
5	• 040-0006-20	• Screw	7
6	• 053-0260-00	• Friction Washer	1
7	• 053-0258-00	• Friction Plug	1
8	• 040-0005-05	• Screw	2
9	• 041-0024-00	• Insert Nut	1
10	• 029-0601-00	• Chair Arm Board (Ice White)	1
	• 029-0601-01	• Chair Arm Board (Pearl Grey)	1
11	• 040-0312-21	• Screw	1
12	• 016-0303-00	• Shear-Loc Knob	1
13	• 045-0001-28	• Washer	1
14	• 041-0312-00	• Jam Nut	1
15	• 041-0312-02	• Low Crown Acorn Nut	1
16	• 030-0449-00	• Inner Telescope Weldment	1
17	• 045-0001-23	• Lockwasher	4
18	• 040-0250-36	• Screw	4

Always Specify Model & Serial Number

© Midmark Corporation 1996 SF-1517 Rev. 7/97

Printed in U.S.A.

Blood Drawing Chair



MA392300

Used On Units With Serial Number HT1000 thru Present

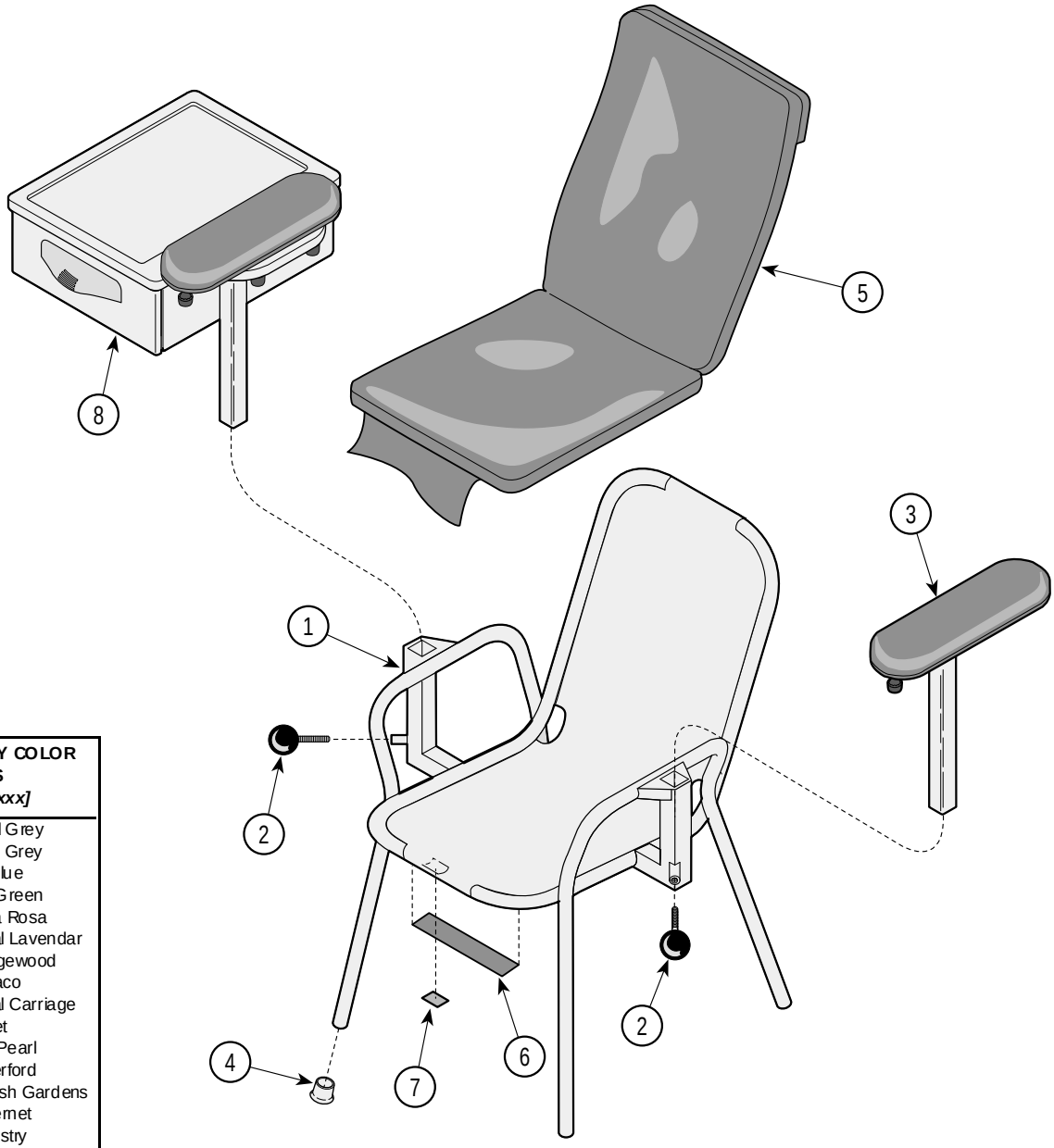
Item	Part No.	Description	Qty.
	165-003	Blood Drawing Chair w/ Lock Swing Arms [Pearl Grey] (Includes Items 1 thru 11)	1
	165-004	Blood Drawing Chair w/ Drawer-[Pearl grey] (Includes Items 1 thru 10 and 12)	1
1	• 030-1094-10	• Chair [Pearl Grey]	1
2	• 028-0460-00	• Arm Board Assembly (Specify Color)	2
3	• 040-0010-56	• Screw	8
4	• 030-1085-10	• Arm Pad Support Weldment	2
5	• 053-0900-00	• Glide	2
6	• 016-0323-00	• Indexing Plunger	2
7	• 053-0897-00	• Guide Bearing	2
8	• 045-0001-116	• Washer	2
9	• 040-0250-86	• Screw	2
10	• 553-0093-02	• Round Tubing Insert	4
11	• 028-0473-00	• Upholstered Set (Specify Color)	1
	• • 053-0105-13	• • Velcro Loop (Not Shown)	1
12	• 029-2125-00	• Drawer Unit Assembly (Specify color) (Includes Items 13 thru 24)	1
13	• • 029-1769-00	• • Drawer Assembly	1
14	• • 053-0703-00	• • Vinyl Insert (Specify color)	1
15	• • 053-0627-01	• • Clear Handle Cover	1
16	• • 016-0680-00	• • L.H. Drawer Slide	1
17	• • 016-0680-01	• • R.H. Drawer Slide	1
18	• • 040-0010-35	• • Screw	5
19	• • 030-1112-00	• • Cabinet Weldment	1
20	• • 063-9833-00	• • Drawer Unit Top	1
21	• • 040-0250-18	• • Screw	4
22	• • 041-0006-01	• • Nut	2
23	• • 029-2251-00	• • Name Plate Assembly	1
24	• • 046-0005-00	• • Allen Wrench (Not Shown)	1

Always Specify Model & Serial Number

© Midmark Corporation 1996 SF-1517 Rev. 6/03

Printed in U.S.A.

Blood Drawing Chair



UPHOLSTERY COLOR CODES
[replace -xxx]

-200 ..... Sand Grey
-201 ..... Slate Grey
-202 ..... Iris Blue
-203 ..... Nile Green
-204 ..... Terra Rosa
-205 ..... Royal Lavendar
-206 ..... Wedgewood
-207 ..... Monaco
-208 ..... Royal Carriage
-209 ..... Monet
-210 ..... Soft Pearl
-211 ..... Waterford
-212 ..... English Gardens
-213 ..... Cabernet
-214 ..... Tapestry
-215 ..... Cathedral
-999 ..... Special

MA564601

Used On Units With Serial Number NS1000 thru Present

Item	Part No.	Description	Qty.
		Note: *The* ***-xxx*** *in the model number denotes upholstery color.* ***Refer to color code chart on this page.***	
	165-005-**xxx**	Blood Drawing Chair - Pearl Grey w/ Lock Swing Arms (includes items 1 thru 7)	1
	165-006-**xxx**	Blood Drawing Chair - Pearl Grey w/ Lock Swing Arms & Drawer (includes items 1 thru 8)	1

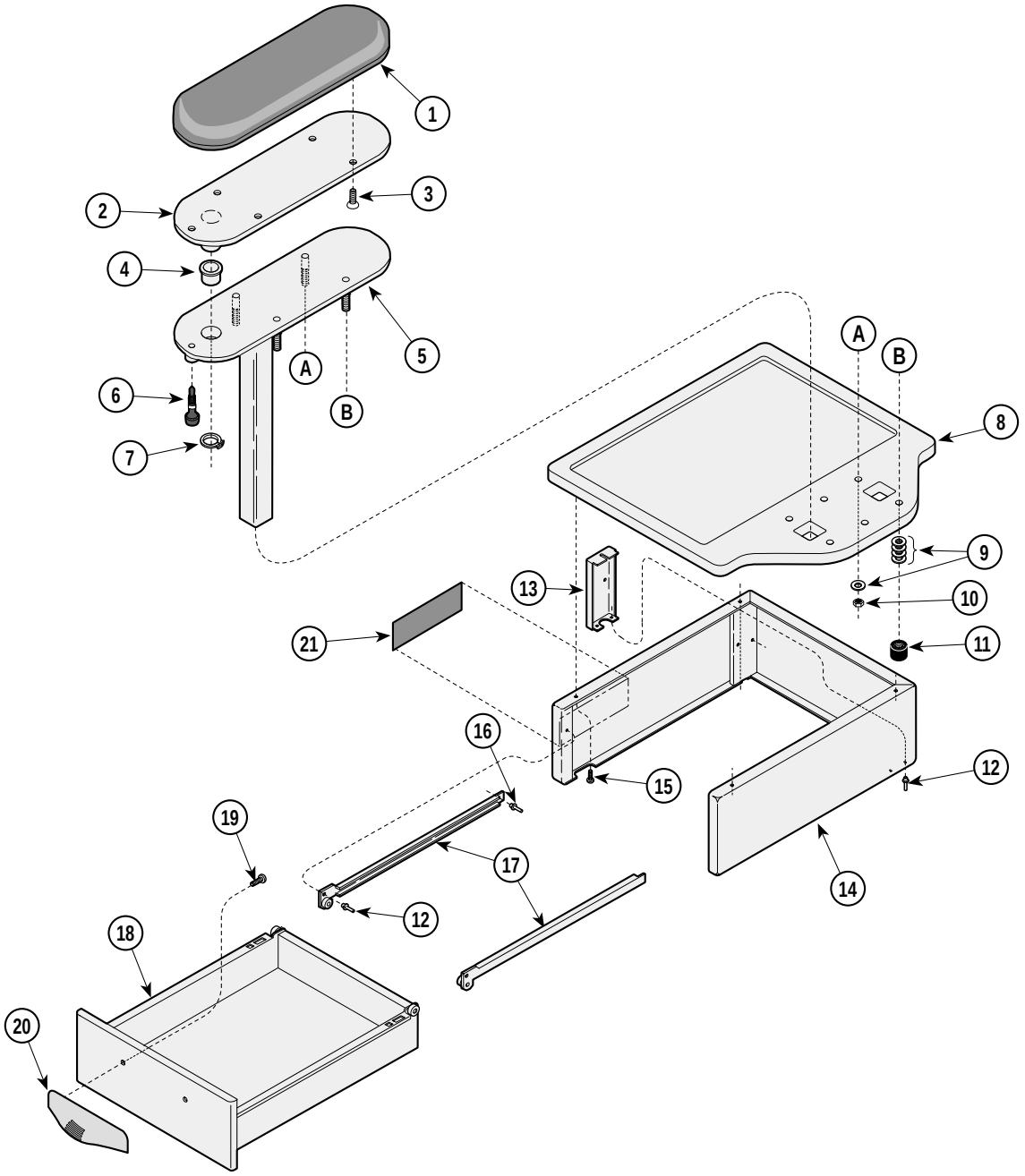
Item	Part No.	Description	Qty.
1	• 030-1238-10	• Chair Weldment	1
2	• 029-2476-00	• Knob Assembly	2
3	• 029-2477-00	• Rotating Arm (Refer to "*Rotating Arm Assembly*")	1
4	• 053-0373-00	• Chair Tip	4
5	• 028-0473-00	• Upholstered Set ***[specify color]***	1
6	• 053-0105-13	• Velcro Loop	1
7	•	• Serial Number Label	1
8	• 002-0722-00	• Drawer Assembly (Refer to "*R.H."Drawer Assembly*")	1

Always Specify Model & Serial Number

© Midmark Corporation 1996 SF-1517 Rev. 1/03

Printed in U.S.A.

R.H. Drawer Assembly



MA564700

Used On Units With Serial Number NS1000 thru Present

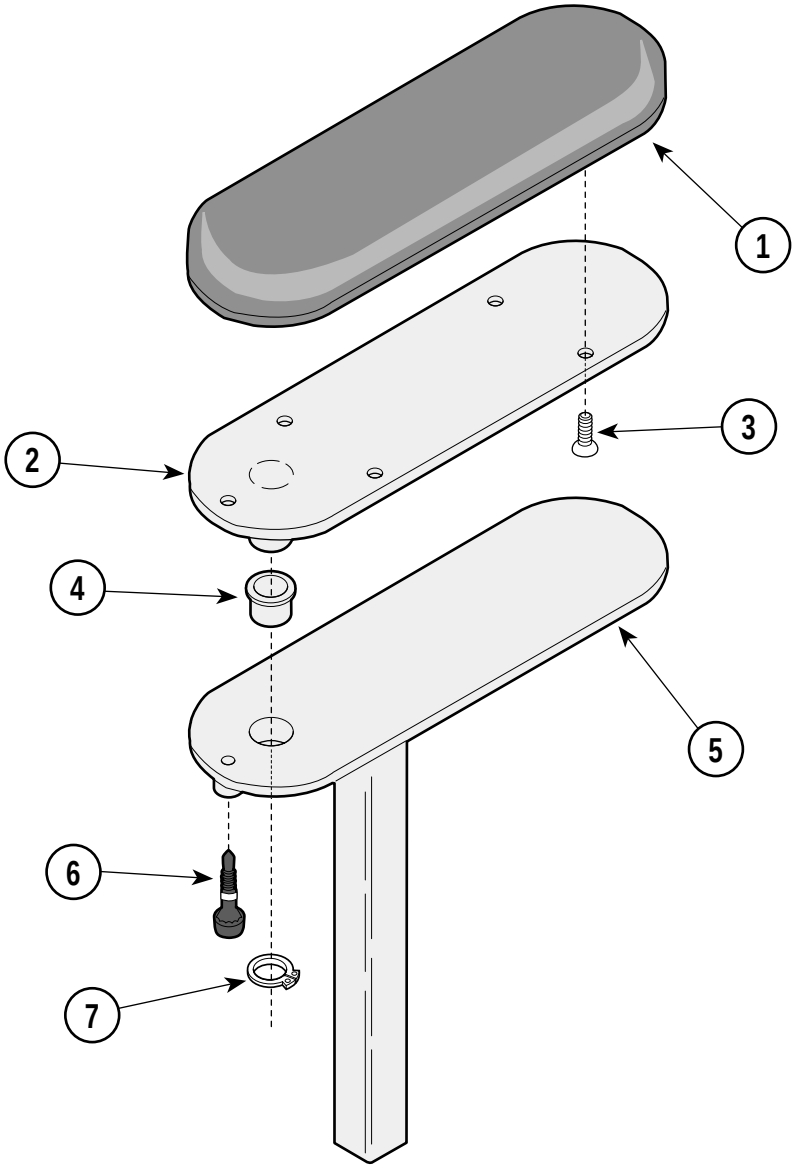
Item	Part No.	Description	Qty.
	029-2475-00	R.H. Drawer Assembly (Includes Items 1 thru 21)	1
1	• 028-0460-XX	• Upholstered Arm Board (Specify Color)	1
2	• 030-1236-10	• Arm Pivot Weldment	1
3	• 040-0010-56	• Screw	4
4	• 016-0392-12	• DU Flange Bearing	1
5	• 030-1235-10	• Drawer Post Weldment	1
6	• 016-0323-00	• Indexing Plunger	1
7	• 042-0056-00	• External Retaining Ring	1
8	• 063-9923-00	• Blood Chair Drawer Top	1
9	• 045-0001-46	• Washer	10
10	• 041-0312-01	• ESNA Nut	2
11	• 016-0845-00	• Rubber Bumper	2
12	• 042-0010-04	• Pop Rivet	6
13	• 050-4795-10	• Slide Support	2
14	• 050-4794-10	• Drawer Cover	1
15	• 040-0010-48	• Screw	4
16	• 042-0010-27	• Pop Rivet	2
17	• 016-0813-04	• Drawer Slide / Runner Set	1
18	• 029-2639-00	• Drawer Assembly	6
19	• 042-0184-00	• Screw	4
20	• 053-1039-00	• Drawer Handle	4
21	• 061-0621-12	• Nameplate Label - 165	1

Always Specify Model & Serial Number

© Midmark Corporation 1996 SF-1517 Rev 6/03

Printed in U.S.A.

Rotating Arm Assembly



MA565100

Used On Units With Serial Number NS1000 thru Present

Item	Part No.	Description	Qty.
	029-2477-00	Rotating Chair Arm Assembly (Includes Items 1 thru 7)	1
1	• 028-0460-XX	• Upholstered Arm Board (Specify Color)	1
2	• 030-1236-10	• Arm Pivot Weldment	1
3	• 040-0010-56	• Screw	4
4	• 016-0392-12	• DU Flange Bearing	1
5	• 030-1237-10	• Drawer Post Weldment	1
6	• 016-0323-00	• Indexing Plunger	1
7	• 042-0056-00	• External Retaining Ring	1

Always Specify Model & Serial Number

© Midmark Corporation 1996 SF-1517 Rev 6/03

Printed in U.S.A.

COMMENTS

The Technical Publications Department of Midmark Corporation takes pride in its publications. We are sure that our manuals will fill all of your needs when you are performing scheduled maintenance, servicing, or repairs on a Midmark product.

However, if you find any errors or feel that there should be a change, addition, or deletion to a manual, please let us know!

Page(s) and Paragraph(s) Needing Changed:

Description of Error or Desired Change:

Please fax or mail a copy of this completed comment sheet to:

Midmark Corporation
ATTN: Technical Publications Department
60 Vista Drive
Versailles, Ohio 45380
Fax: (937) 526-5542

© Midmark Corporation 2000 SF-1621

Printed in U.S.A.

Return To Table Of Contents

FAX ORDERING FORM

(SERVICE PARTS ONLY)

NOTES:

- **ALL BLOCKED AREAS MUST BE COMPLETED.**
- **USE FOR NON-WARRANTY FAX ORDERS ONLY. WARRANTY ORDERS MUST BE TELEPHONED IN (1-800-MIDMARK).**

ATTENTION: SERVICE DEPARTMENT FAX#: 877-249-1793

ACCT #: _____ **P.O. #:** _____ **DATE:** _____

NAME: _____ **SHIP TO:** _____

ADDRESS: _____

CITY, ST.: _____

CONTACT: _____

PHONE: _____

☐ **NON-EMERGENCY ORDER - TO SHIP WITHIN 72 HOURS IF PART(S) IN STOCK.**

☐ **EMERGENCY ORDER - TO SHIP WITHIN 24 HOURS IF PART(S) IN STOCK (IF ORDER IS RECEIVED BEFORE 1:30 P.M. E.S.T).**

SEND NOTIFICATION IF PARTS ARE NOT AVAILABLE TO SHIP WITHIN 24 HOURS VIA E-MAIL OR FAX TO: _____

METHOD OF SHIPMENT **OTHER** _____

UPS	FED EX
☐ NEXT DAY A.M.	☐ NEXT DAY A.M.
☐ NEXT DAY P.M.	☐ NEXT DAY P.M.
☐ 2ND DAY	☐ 2ND DAY
☐ GROUND	☐ ECONOMY

QTY.	PART #	DESCRIPTION (SPECIFY COLOR OF ITEM IF APPLICABLE)	COLOR CODE	PRICE/PER

Return To Table Of Contents

Return To Table Of Contents

Midmark Corporation
60 Vista Drive
P.O. Box 286
Versailles, Ohio 45380-0286
937-526-3662
Fax 937-526-5542
midmark.com

Because we care.

Subject To Change Without Notice

© Midmark Corporation - 2003

Printed in U.S.A.